

We claim:

Sub A7

1. A method for representing addressing information in a communication system, the method comprising encoding at least one address using a regular expression and using the regular expression in place of the at least one address.

Sub B7

2. The method of claim 1, wherein the at least one address comprises at least one X.121 address.

Sub A2

3. The method of claim 2, wherein using the regular expression in place of the at least one address comprises storing the regular expression in a source address field of an address configuration table.

Sub B7

4. The method of claim 1, wherein the at least one address comprises at least one MAC address.

Sub A3

5. The method of claim 4, wherein using the regular expression in place of the at least one address comprises storing the regular expression in a source address field of an address configuration table.

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6. The method of claim 1, wherein using the regular expression in place of the at least one address comprises using the regular expression to specify at least one address of an address pool.

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7. The method of claim 1, wherein using the regular expression in place of the at least one address comprises storing the regular expression in a management information base.

Sub A³ >

8. A network device comprising a storage including a regular expression representing at least one address.

Sub B >

9. The network device of claim 8, wherein the storage comprises an address configuration table.

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10. The network device of claim 9, wherein the regular expression defines a source address group.

11. The network device of claim 8, wherein the storage comprises a management information base.

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12. The network device of claim 11, wherein the regular expression defines an address pool.

13. The network device of claim 8, wherein the storage comprises a routing table.

14. The network device of claim 11, wherein the regular expression defines a forwarding equivalence class for a routing table entry.

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Sub A7

15. An address configuration table for mapping a plurality of source devices in a source network to a single destination device in a destination network, the address configuration table comprising an address configuration table entry having a regular expression representing a plurality of source device addresses.

Sub A4

16. A management information base comprising a management object for storing a regular expression representing at least one address.